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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/003,756	11/01/2001	Carsten Schuh	P99,0663-01	8592

7590 08/18/2005

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EXAMINER	
NGUYEN, DONGHAI D	
ART UNIT	**PAPER NUMBER**
3729	

DATE MAILED: 08/18/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/003,756	SCHUH ET AL.	
	Examiner	Art Unit	
	Donghai D. Nguyen	3729	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☐ Responsive to communication(s) filed on *08 July 2005*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-3,5,7-10 and 23-31* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1-3,5,7-10,23-28,30 and 31* is/are rejected.

7)☒ Claim(s) *29* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☒ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☒ Certified copies of the priority documents have been received in Application No. 09/285,917.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Response to Amendment

1. Applicants' amendment filed on July 8, 2005 has been considered and made of record.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

3. Claims 1-3, 5, 7-10, 23-24 and 31 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent 5,861,577 to Tamura et al in view of US Patent 5,439,031 to Steele et al.

Regarding to claims 1, 7, 10 and 31, Tamura et al disclose a method for producing an electrical or electronic component, the method comprising the steps of: providing a body of plastic material (3, Col. 8, lines 13-17) for accommodating and encapsulating a portion of the outer surface of the component (2), the body being a hollow body (3a) having an inside surface that is inverse in form to the outer surface of the component and an outer surface (Fig. 2), inserting the component into the body (Fig. 2, Col. 10, lines 2-4), and then joining the surface of the component to the body by applying pressure to the outer surface of the body of plastic material (Fig. 1 and Col. 10, lines 25-38). Tamura et al is silent regarding partially cross-linked the plastic material. Steele et al teach the step of partially cross-link the plastic material (Col. 5, lines 28-31) consisting silicone, stabilizing element and adhesion agent (Col. 3, lines 11-55) for

providing a air and water-tight seal over the covered component (see Col. 6, lines 35-40). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Tamura's plastic material by partially cross-link the plastic as taught by Steele et al for providing better air and water-tight seal over the covered component.

Limitation of claim 2 is also met by Tamura et al (see Col. 19, lines 14-15).

Regarding limitation of claim 3 refers to Fig. 2 of Tamura et al.

Regarding Claim 5, each reference discloses the body has at least two parts. Note that each of the components does have a number of associated individual parts such as top, bottom, side, and insertion terminals that are individual related parts. Therefore, limitation of claim 5 is met by each of the references above or in combination.

Regarding claims 8 and 9, Tamura et al disclose the material of the body comprises a substance for mediating adhesion (Col. 8, lines 10-17) and the step of inserting the component includes inserting the component with the outer surface with a substance (Col. 19, lines 7-10).

Regarding claim 23, Tamura et al disclose a method for producing an electrical or electronic component, comprising steps of: providing a component (2) with the outer surface, molding a plastic material to form a tubular body (3, Col. 10, lines 14-24) having an outside surface and a hollow space with an inside surface (3a) that is inverse in form to the outer surface of the component (2), inserting the component into the hollow space of the tubular body (Fig. 2), and then applying pressure to an outer surface of the body to join the inside surface of the hollow space to the outer surface of the component to secure the plastic coating on the outer surface of the component (Fig. 1 and Col. 10, lines 25-38). Tamura et al is silent regarding partially cross-linked the plastic material. Steele et al teach the step of partially cross-link the plastic material

(Col. 5, lines 28-31) for providing a air and water-tight seal over the covered component (see Col. 6, lines 35-40). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Tamura's plastic material by partially cross-link the plastic as taught by Steele et al for providing better air and water-tight seal over the covered component. Note that the recited limitation "cross-linked plastic material" is material related which is not a critical feature of the claimed method, since cross-linked plastic is material's properties and it appears that the use of prior art material would result at least equally or the same.

Regarding claim 24, Figs 1-3 of Tamura et al show the step of applying pressure presses a device on the outside surface of the body to create the pressure to join the inside surface of the hollow space on the outer surface of the component.

4. Additionally, Claims 1-3, 5, 7-10, 27-28 and 31 are also rejected under 35 U.S.C. 103(a) as being unpatentable over US Design Patent Re. 33,137 to Gurevich et al in view of US Patent 5,439,031 to Steele et al.

Regarding to claims 1, 7, 10 and 31, Gurevich et al disclose a method for producing an electrical or electronic component (15), comprising steps of: providing a body of plastic material (170) for accommodating and encapsulating a portion of the outer surface of the component (15), the body being a hollow body (box-like shaped) having an inside surface that is inverse in form (rectangular box) to the outer surface of the component and an outer surface (Fig. 3), inserting the component into the body (Fig. 1), and then joining the surface of the component to the body by applying pressure to the outer surface of the body of plastic material (Fig. 2 and Col. 6, lines

58-59). Gurevich et al do not teach the step of partially cross-linked the plastic material. Steele et al teach the step of partially cross-link the plastic material (Col. 5, lines 28-31) consisting silicone, stabilizing element and adhesion agent (Col. 3, lines 11-55) for providing a air and water-tight seal over the covered component (see Col. 6, lines 35-40). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Gurevich's plastic material by partially cross-link the plastic as taught by Steele et al for providing better air and water-tight seal over the covered component.

The limitation of claim 2 is met by Gurevich et al (see Col. 7, lines 37-39).

Regarding claim 5, Gurevich et al disclose the body has at least two individual parts (top and bottom in form of integration).

Regarding claims 8 and 9, Gurevich et al disclose the material of the body comprises a substance for mediating adhesion and the step of inserting the component includes inserting the component with the outer surface with a substance (Figs. 6-7).

Regarding claims 3, 23, 24 and 26, Gurevich et al disclose a method a for producing an electrical or electronic component, comprising steps of: providing a component (15) having the outer surface has contact lugs (160) connected to electrical terminals (20/30); molding the plastic body (170) having a outer surface and hollow space with an inside surface; insert the component into the hollow space of the body; and applying pressure to an outer surface of the body to join and secures the plastic coating on the outer surface of the contact lugs and portions of the terminals of the component in addition to the outer surface of the component (Figs. 2-3 and Col. 6, lines 58-59). Gurevich et al do not teach the step of partially cross-linked the plastic material. Steele et al teach the step of partially cross-link the plastic material (Col. 5, lines 28-31) for

providing a air and water-tight seal over the covered component (see Col. 6, lines 35-40). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Gurevich's plastic material by partially cross-link the plastic as taught by Steele et al for providing better air and water-tight seal over the covered component.

Further, Gurevich et al do not show the plastic body in a tubular body. It would have been an obvious matter of design choice to one having ordinary skill in the art at the invention was made to choose to mold the plastic body in any form or shape, since Applicants have not disclose the particular tubular body solves any stated problem or is for any particular reason; and it appears that the invention perform equally well with the plastic body of as taught by Gurevich et al. Further, it is well known to mold/coating the passivated body to match the designed shape of the component in the art of encapsulating an electronic component.

Regarding claim 27, Gurevich et al disclose the outer surface of the component (15) has at least one contact lug (160) connected to an electrical terminal (20/30), and the step of joining the surface of the component to the body joins the inside surface of the body to the contact lug, a portion of the terminal and the outer surface of the component (Figs 2-3).

Regarding claim 28, Gurevich et al disclose a method for producing an electrical or electronic component, comprising steps of: providing a body of plastic material (170) for accommodating and encapsulating a portion of the outer surface of the component (15), said body being a hollow body (box-like shaped) having an inside surface that is inverse in form to the outer surface of the component, the contact lug (160) and terminal (20/30), inserting the component into the body (Fig. 1), joining the surface of the component to the body by applying pressure to an outer surface of the body of plastic material to pressure the inside surface of the

body on the contact lug, a portion of the terminal and the outer surface of the component (Figs. 2-3 and Col. 6, lines 58-59). Gurevich et al do not teach the step of partially cross-linked the plastic material. Steele et al teach the step of partially cross-link the plastic material (Col. 5, lines 28-31) for providing a air and water-tight seal over the covered component (see Col. 6, lines 35-40). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Gurevich's plastic material by partially cross-link the plastic as taught by Steele et al for providing better air and water-tight seal over the covered component.

5. Claim 30 is rejected under 35 U.S.C. 103(a) as being unpatentable over either Tamura or Gurevich et al in view of Steele et al as applied above, and further in view of US Patent 5,148,077 to Grawey et al.

Tamura/Gurevich et al as modified and relied above do not teach a device having at least one drain opening. Grawey et al teach a device having at least one drain opening (see Fig. 6 and Col. 5, lines 34-36) for draining the excess plastic material. Therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to further modify Tamura/Gurevich et al by utilizing the device having at least one drain opening as taught by Grawey et al for draining the excess plastic.

Allowable Subject Matter

6. Claim 29 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Response to Arguments

7. Applicant's arguments with respect to claims 1-3, 5, 7-10 and 33-31 have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Donghai D. Nguyen whose telephone number is (571)-272-4566. The examiner can normally be reached on Monday-Friday (9:00-6:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Peter D. Vo can be reached on (571)-272-4690. The fax phone number for the organization where this application or proceeding is assigned is **571-273-8300**.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

DN
August 12, 2005

MINH TRINH
PRIMARY EXAMINER